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Piper Marbury Rudnick & Wolfe
1200 Nineteenth Street N W
Washington, DC 20036-2412

EXAMINER

STEIN, STEPHEN J

ART UNIT

PAPER NUMBER

1775

6

DATE MAILED: 06/26/2003

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application No.

10/069,130

Applicant(s)

DEGAND, ETIENNE

Examiner

Stephen J Stein

Art Unit

1775

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).
- Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☐ Responsive to communication(s) filed on ____.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 30-49 is/are pending in the application.
- 4a) Of the above claim(s) ____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) ____ is/are allowed.
- 6) ☒ Claim(s) 30,32,33,36,38-40,42,43,48 and 49 is/are rejected.
- 7) ☒ Claim(s) 31,34,35,37,41 and 44-47 is/are objected to.
- 8) ☐ Claim(s) ____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on ____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
- Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
- 11) ☐ The proposed drawing correction filed on ____ is: a) ☐ approved b) ☐ disapproved by the Examiner.
- If approved, corrected drawings are required in reply to this Office action.
- 12) ☐ The oath or declaration is objected to by the Examiner.

Priority under 35 U.S.C. §§ 119 and 120

- 13) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☒ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
 2. ☐ Certified copies of the priority documents have been received in Application No. ____.
 3. ☒ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- * See the attached detailed Office action for a list of the certified copies not received.
- 14) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. § 119(e) (to a provisional application).
- a) ☐ The translation of the foreign language provisional application has been received.
- 15) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. §§ 120 and/or 121.

Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☐ Information Disclosure Statement(s) (PTO-1449) Paper No(s) ____.
- 4) ☐ Interview Summary (PTO-413) Paper No(s). ____.
- 5) ☐ Notice of Informal Patent Application (PTO-152)
- 6) ☐ Other: _____.

DETAILED ACTION

Claim Rejections - 35 USC § 102

1. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

2. Claims 30, 36, 39, 40 and 49 are rejected under 35 U.S.C. 102(b) as being anticipated by US Patent 5,529,654 (Kavanagh et al.).

Kavanagh teaches a process for forming a safety glazing laminate for vehicle windshields comprising two glass carrier layers (glazing materials) with a solar radiation control stack in between (col. 1, lines 8-19, col. 3, lines 10-26 and Figure 1). The reference further teaches the solar control stack consists of successive 5 to 7 sputter deposited alternate layers of silver metal and indium tin oxide (col. 6, lines 26-44). Kavanagh still further teaches that the glass sheets are bent to form a radius of curvature of 32.5cm (325mm) (col. 7, lines 33-38).

Claim Rejections - 35 USC § 103

3. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

4. Claims 32 and 42 are rejected under 35 U.S.C. 103(a) as being unpatentable over Kavanagh.

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As stated above, Kavanagh teaches a process for forming a safety glazing laminate for vehicle windshields comprising two glass carrier layers with a solar radiation control stack of sputter deposited alternate layers of silver metal and indium tin oxide with a 325mm radius of curvature.

Although, the reference fails to disclose a laminate width of greater than about 1.6 m, absent a showing of criticality with respect to the width of the glazing, it would have been obvious to one of ordinary skill in the art at the time of the invention to select varying widths of the glazings to match different size vehicles.

5. Claims 32, 33, 42 and 43 are rejected under 35 U.S.C. 103(a) as being unpatentable over Kavanagh in view of US Patent 5,128,513 (Byars et al.).

As stated above, Kavanagh teaches a process for forming a safety glazing laminate for vehicle windshields comprising two glass carrier layers with a solar radiation control stack of sputter deposited alternate layers of silver metal and indium tin oxide with a 325mm radius of curvature. Kavanagh fails to teach that the coating layer is adapted to be electrically heatable, in which a pair of spaced bus bars are adapted to relay electrical power to the solar control layer.

Byars teaches a windshield comprising two laminated sheets of glass having parallel spaced apart bus bars connected by leads to an electrically conductive film stack of silver layers sandwiched between dielectric films so as to electrically heat the windshield and provide defogging (col. 1, lines 5-16, col. 3, lines 51-68 and col. 4, lines 68).

Therefore, it would have been obvious to a person of ordinary skill in the art at the time of the invention to add bus bars to the bring current to the solar control film as disclosed by Byars to the windshield as taught by Kavanagh because it would provide defogging properties to

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the Kavanagh windshield. With regard to the claimed width of the windshield, although, the reference fails to disclose a laminate width of greater than about 1.6m, absent a showing of criticality with respect to the width of the glazing, it would have been obvious to one of ordinary skill in the art at the time of the invention to select varying widths of the glazings to match different size vehicles.

6. Claims 38 and 48 rejected under 35 U.S.C. 103(a) as being unpatentable over Kavanagh in view of Byars as applied to claims 32 and 42 above, and further in view of US Patent 5,128,513 (Criss).

Kavanagh in view of Byars fails to teach the addition of an opaque band arranged on the internal surface of the glazing panel to mask the bus from a view from the exterior.

Criss teaches a windshield which is electrically heated with bus bars provided along the margins of the windshield (col. 2, lines 24-68). Criss further teaches that as an additional feature, an opaque boarder which may be ceramic enamel may be applied to conceal the bus bars and attachment means (col. 3, lines 51-60).

Therefore, it would have been obvious to a person of ordinary skill in the art at the time of the invention to apply an opaque coating to the bus bars as disclosed by Criss to the windshield suggested by Kavanagh in view of Byars, because it would conceal the bus bars to those looking externally into the windshield.

Allowable Subject Matter

7. Claims 31, 34, 35, 37, 41 and 44-47 are objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.

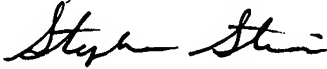
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While the prior art discloses and suggests the claimed the claimed windshield having the claimed radius of curvature width and bus bars, the prior art fails to teach or disclose the other additional claimed features of the depth of bending, cross curvature, luminous transmittance and CIElab values.

Conclusion

8. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Stephen Stein whose telephone number is (703) 305-0583. The examiner can normally be reached on Monday through Friday from 8:30 a.m. to 5:00 p.m. If the attempts to reach the examiner are unsuccessful, the examiner's supervisor, Deborah Jones can be reached by dialing (703) 308-3822. Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the Group Receptionist whose phone number is (703) 308-0661. The fax phone number for this group is (703) 872-9310 for non-final responses and (703) 872-9311 for after final responses.

June 20, 2003



Stephen J. Stein